Amendments to the Claims

Please amend claims 1, 3-5 and 7-13 as shown in the following list of claims. This listing of claims will replace all prior versions, and listings, of claims in the application.

1. (currently amended) Computer graphics processor having a renderer for rendering in parallel N, 3D ~~2D~~ images of a 3D model, said renderer comprising:
[[-]] a rasterizer for transversing a surface grid over a surface of primitives of said 3D images for all N different views of said 3D images,
[[-]] a shader unit for determining a color of the output of the rasteriser and forwarding a shaded color sample along with its screen coordinates, and
[[-]] N screen space resamplers each for resampling the shaded color sample determined by said shader unit ~~means~~ according to one of the N different views.

2. (previously presented) Computer graphics processor according to claim 1, further comprising:
a texture memory for storing texture maps,
wherein said surface grid is derived from a texture map being associated with said primitive and being stored in said texture memory.

3. (currently amended) Computer graphics processor according to claim 2,
wherein a grid associated to one of the texture maps stored in the texture memory is chosen as said surface grid, if three requirements are fulfilled, said three requirements including:
said texture map is addressed independently,[[.]]
said texture map is based on a 2D texture, and
the texture coordinates at the vertices do not make up a degenerate primitive.

4. (currently amended) Computer graphics processor according to claim 3, wherein

the texture map with the largest area in texture space is chosen, if more than one texture maps stored in said texture memory fulfill said three requirements [[a)-c)]].

5. (currently amended) Computer graphics processor according to claim 1 or 2, further comprising:

a means for addressing a display screen,

said renderer having an input for the [[a]] 3D model and an input for at least one viewpoint for rendering image information for supplying to the addressing means,

wherein the renderer further comprises an initial part having an input for the 3-D model and for at least one main view point for rendering objects in the form of at least one main view point Z-stack having stack layers with color information and Z-values,

the renderer further comprising

a Z-stack constructor in which, from the at least one main view point Z-stack generated by the initial stage, Z-stacks for additional viewpoints are constructed, and a further image information occlusion semantics stage for generating image information from the z-stacks.

6. (previously presented) Computer graphics processor according to claim 5, wherein said renderer further comprises

an object extracter for extraction of objects from a view point z-stack.

7. (currently amended) Computer graphics processor according to claim 6, wherein the object extracter is arranged for extracting objects from the at least one main view point ~~view~~ z-stack.

8. (currently amended) Computer graphics processor according to claim 5, wherein the renderer comprises a DOF rendering stage

wherein the DOF rendering stage is arranged for DOF processing of the at least one main view point ~~view~~ z-stack into [[a]] at least one main view point z-stack comprising DOF blurring.

9. (currently amended) Method of rendering N different views of 3D images, comprising the steps of:

[[-]] transversing a surface grid over a surface of primitives of said 3D images for all the different N views of said 3D images,

[[-]] determining a color of the output of the transversing ~~rasteriser~~ and forwarding a shaded color sample along with its screen coordinates, and

[[-]] resampling the shaded color sample ~~determined by said shader means~~ for each of the N different views.

10. (currently amended) Method of rendering N views of 3D images according to claim 9, further comprising the steps of:

storing texture maps in a texture memory

wherein said surface grid is derived from a texture map being associated with said primitive and being stored in said texture memory.

11. (currently amended) Method of rendering N views of 3D images according to claim 10,

wherein a grid associated to one of the texture maps stored in the texture memory is chosen as surface grid, if three requirements are fulfilled, said three requirements including:

said texture map is addressed independently,[[.]]

said texture map is based on a 2D texture, and

the texture coordinates at the vertices do not make up a degenerate primitive.

12. (currently amended) Method of rendering N views of 3D images according to claim 11, wherein

the texture map with the largest area in texture space is chosen, if more than one texture maps stored in said texture memory fulfill said three requirements [[a)-c)]].

13. (currently amended) Method of rendering N views of 3D images according to claim 11, further comprising the steps of:

supplying data and addressing means of a 3D display device wherein for a main view point objects in the form of at least one main view point Z-stack comprising stack layers are rendered with RGB and Z-values, and

constructing ~~construction~~ from the at least one main view point Z-stack z-stacks for additional viewpoints, and

generating from the Z-stacks for additional viewpoints by means of Z-tracing data to be supplied to the addressing means.

14. (previously presented) Computer program product comprising program code means stored on a computer readable medium for performing a method according to claim 9, when said program is run on a computer.